METALLIC HONEYCOMB AS CATALYST CARRIER WITH MICROSTRUCTURES FOR FLOW MIXING

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Inventor(s): MAUS WOLFGANG (DE); WIERES LUDWIG (DE)

Applicant(s): EMITEC EMISSIONSTECHNIK (DE)

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Abstract

A metallic honeycomb body, such as a catalyst carrier body for the exhaust system of a motor vehicle, includes sheet metal layers at least partly having at least one macrostructure forming a plurality of channels for conveying a fluid in a given flow direction. The at least one macrostructure determines a shape of the honeycomb body, an average channel width and essential mechanical properties of the honeycomb body. At least a part of the sheet metal layers have at least partial regions with microstructures. The microstructures have a height being substantially from 0.01 to about 0.3 times the average channel width and being at least 15 mu m. The microstructures extend transversely or at an angle relative to the given flow direction and are spaced substantially from 1-10 mm apart from each other in the given flow direction.